

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION VIII

999 18th STREET - SUITE 500 DENVER, COLORADO 80202-2466

Ref: 8P2-W-GW

JAN 30 1997

CERTIFIED MAIL RETURN RECEIPT REQUESTED

Ms. Angela R. Ely Administrative Operations Manager Petroglyph Operating Company, Inc. 6209 North Highway 61 Hutchinson, Kansas 67502

RE: UIC Minor Permit Modification
Conversion of Additional Well to
Antelope Creek Waterflood
EPA Area Permit UT2736-00000
Duchesne County, Utah

Dear Ms. Ely:

Your letter of January 13, 1997, requesting that the following production well be converted to Class II enhanced oil recovery well and added to the Antelope Creek Waterflood, as authorized under EPA Area Permit UT2736-00000, is hereby granted.

NAME LOCATION EPA WELL PERMIT NO.

Ute Tribal 18-08 SE NE Section 18 UT2736-04355 T 5 S - R 3 W

This additional well is within the boundary of the existing area permit for the Antelope Creek Waterflood (UT2736-00000), and this addition is made by minor permit modification according to the terms and conditions of that permit. Unless specifically mentioned in this Minor Permit Modification, all terms and conditions of the original permit will apply to the construction, operation, monitoring, and plugging and abandonment of this additional injection well. The proposed well location, well schematic, conversion procedures, and revised plugging and abandonment plan and schematic, submitted by your office, have been reviewed and approved as follows:

- (1) The **conversion** of this production well has been reviewed and found satisfactory as submitted, therefore, no corrective action is required.
- (2) Maximum injection pressure (Pmax) for this well is as follows:

Pmax = [Fg - 0.433 (Sg)] d

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RE:

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Pmax = [Fg - 0.433 (Sg)] d

Where: Pmax = Maximum surface injection pressure

at wellhead

d = 4384' shallowest perforations

Sq = Specific gravity of injected water

Pmax = [0.88 - .433 (1.00)] 4384

Pmax = 1960 psig

Until such time as the permittee demonstrates that a fracture gradient other than .88 psi/ft applies to the disposal zones of this newly converted well, the maximum allowable wellhead injection pressure (Pmax) for this well will be 1960 psig.

(3) The plugging and abandonment plan and schematic, submitted by your office, has been reviewed, revised and approved.

Prior to commencing injection into this well, permittee must fulfill permit condition Part II, C. 2. and have received written authorization to inject by the Environmental Protection Agency. In summary, these requirements for your newly permitted injection well are:

- (1) All conversion is complete and the permittee has submitted a completed Well Rework Record (EPA Form 7520-12).
- (2) The pore pressure has been determined.
- (3) The well has successfully completed and passed an mechanical integrity test (MIT), guidance enclosed.

All other provisions and conditions of the permit remain as originally issued.

If you have any questions, please contact Mr. Chuck Williams at (303) 312-6625. Also, please direct the above requirements to Mr. Williams at the above letterhead address, citing MAIL CODE 8P2-W-GW. Thank you for your continued cooperation.

Sincerely,

Kerrigan G. Clough

Assistant Regional Administrator Office of Pollution Prevention, State and Tribal Assistance Enclosure: MIT Guidance and EPA Form

cc: Mr. Ferron Secakuku Energy & Mineral Resource Dep't. Ute Indian Tribe

> Ms. Ruby Atwine, Chairperson Uintah & Ouray Business Committee Northern Ute Tribe

Mr. Norman Cambridge BIA - Uintah & Ouray Agency

Mr. Gil Hunt State of Utah Natural Resources Division of Oil, Gas, and Mining

Mr. Jerry Kenczka BLM - Vernal District Office

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Receipt for Certified Mail
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